

### **AMENDMENTS TO THE CLAIMS**

1. (Currently Amended) A method for providing automated diagnosis of problems for a computer network, comprising:

receiving input regarding a problem with the computer network;

identifying configuration changes made to components of the computer network that are associated with parameters of the problem;

associating each of the identified configuration changes with a rank based on a likelihood that each of the identified configuration changes caused the problem, the rank determined based on a proximity of each of the configuration changes to the problem, a difference in time between an occurrence of each of the configuration changes and an occurrence of the problem, and a security sensitivity associated with the components of the computer network; and

verifying that the ranked configuration changes are related to the problem.

2. (Currently Amended) The method of ~~claim 7~~ claim 1, further comprising:

formulating a list of the configuration changes based on or ordered in terms of the ~~adjusted~~ rank associated with each of the verified configuration changes; and

presenting the list to a user.

3. (Currently Amended) The method of ~~claim 7~~ claim 1, further comprising:

determining a distance between each of the configuration changes and the problem;

comparing the determined distance associated with each of the verified configuration changes with a configurable distance threshold; and

discarding any of the verified configuration changes associated with the determined distance that violates the configurable distance threshold.

4. (Currently Amended) The method of claim 1, further comprising:

recording the configuration changes made to the computer network at a first level of detail; and

in response to receiving the input regarding the problem, recording the configuration changes associated with the problem at ~~an adjusted level of detail~~ a second level of detail, wherein the second level of detail is greater than the first level of detail.

5. (Previously Presented) The method of claim 1, further comprising accumulating and filtering the received input associated with the problem until all of the input is received.

6. (Previously Presented) The method of claim 1, further comprising searching a database having user records, vulnerability and reliability data to verify the ranked configuration changes.

7. (Canceled)

8. (Currently Amended) A computer-readable medium executable on a computer having a program for providing automated diagnosis of problems for a computer network, comprising:

logic configured to receive input regarding a problem with the computer network;

logic configured to identify configuration changes made to components of the computer network that are associated with parameters of the problem;

logic configured to associate each of the identified configuration changes with a rank based on a likelihood that each of the identified configuration changes caused the problem, the rank determined based on a proximity of each of the configuration changes to the problem, a difference in time between an occurrence of each of the configuration changes and an occurrence of the problem, and a security sensitivity associated with the components of the computer network; and

logic configured to verify that the ranked configuration changes are related to the problem.

9. (Currently Amended) The computer-readable medium of ~~claim 10~~ claim 8, further comprising:

logic configured to formulate a list of the configuration changes based on the ~~adjusted~~ rank associated with each of the verified configuration changes; and

logic configured to present the list to a user.

10. (Canceled)

11. (Currently Amended) The computer-readable medium of claim 8, further comprising:

logic configured to record the configuration changes made to the computer network at a first level of detail; and

logic configured to record the configuration changes associated with the problem ~~at an adjusted~~ a second level of detail in response to receiving the input regarding the problem, wherein the second level of detail is greater than the first level of detail.

12. (Previously Presented) The computer-readable medium of claim 8, further comprising logic configured to accumulate and filter the received input associated with the problem until all of the input is received.

13. (Previously Presented) The computer-readable medium of claim 8, further comprising logic configured to search a database having user records, vulnerability and reliability data to verify the ranked configuration changes.

14. (Currently Amended) A system for providing automated diagnosis of problems for a computer network, comprising:

means operative to receive input regarding a problem with the computer network;

means operative to identify configuration changes made to components of the computer network that are associated with parameters of the problem;

means operative to associate each of the identified configuration changes with a rank based on a likelihood that each of the identified configuration changes caused the problem, the rank determined based on a proximity of each of the configuration changes to the problem, a difference in time between an occurrence of each of the configuration changes and an occurrence of the problem, and a security sensitivity associated with the components of the computer network; and

means operative to verify that the ranked configuration changes are related to the problem.

15. (Previously Presented) The system of claim 14, further comprising means operative to receive policy or profile input from a user's processing device or policy-management systems and to convert the policy or profile input into usable data.

16. (Canceled)

17. (Currently Amended) The system of claim 14, ~~further comprising~~ wherein the means operative to verify that the ranked configuration changes are related to the problem include:

a database populated with descriptive system information; and

a database structure configured as hierarchical database pages, each database page having a page index, data section and selector section, wherein the data section is further configured to include reliability or vulnerability information associated with ~~an element~~ the components of the computer network associated with the problem to verify that the ranked configuration changes are related to the problem, and wherein the selector section is further configured to include links to ~~related~~ other related database pages of the database structure.

18. (Previously Presented) The system of claim 14, further comprising means operative to accumulate and filter the received input regarding the problem with the computer network until all of the input is received.

19. (Currently Amended) The system of claim 14, wherein the parameters of the problem include at least one of ~~an element~~ a component of the computer network experiencing the problem, ~~an element~~ a component of the computer network affected by the problem, and a time at which the problem was first noted.

20. (Currently Amended) The method of claim 1, wherein the parameters of the problem include at least one of ~~an element~~ a component of the computer network experiencing the

problem, ~~an element~~ a component of the computer network affected by the problem, and a time at which the problem was first noted.

21. (Currently Amended) The computer-readable medium of claim 8, wherein the parameters of the problem include at least one of ~~an element~~ a component of the computer network experiencing the problem, ~~an element~~ a component of the computer network affected by the problem, and a time at which the problem was first noted.

22. (Currently Amended) The system of ~~claim 16~~ claim 14, further comprising:  
means operative to formulate a list of the configuration changes based on the ~~adjusted~~ rank associated with each of the verified configuration changes; and  
means operative to present the list to a user.

23. (Previously Presented) The system of claim 17, further comprising means operative to enable provisioning and access to the database and the database structure.

24. (Previously Presented) The system of claim 17, wherein the database comprises an element descriptive database (EDD).

25. (Previously Presented) The system of claim 17, wherein the database structure comprises a hierarchical vulnerability database (HVD) structure.

26. (New) The method of claim 1, wherein verifying that the ranked configuration changes are related to the problem includes cycling through a database structure configured as hierarchical database pages, each of the database pages having a page index, data section and selector section, wherein the data section includes reliability information associated with the components of the computer network associated with the problem to verify that the ranked configuration changes are related to the problem, and wherein the selector section includes links to other related database pages of the database structure for cycling through the database structure.

27. (New) The system of claim 14, further comprising:

means operative to record the configuration changes made to the computer network at a first level of detail; and

means operative to record the configuration changes associated with the problem at a second level of detail in response to receiving the input regarding the problem, wherein the second level of detail is greater than the first level of detail.